



WWW.SAEEDMDCAT.COM



QUIZZES

Practice Test-1 (Coordination and Control)



10 Questions



7 min

Topics

Steps involved in Nervous Coordination, Neurons (Structure and Types), Reflex Action and Reflex Arc, Nerve Impulse, Sensory Receptors and Their Working

SAEED MDCAT

SAEED MDCAT TEAM

Start Quiz



SAEEDMDCAT



1/10



7 min



Hint

Q : The mechanisms that is found in animals only:

A

Diffusion

B

Nervous control

C

Respiration

D

Hormonal control

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

1

2

3

4

5

6

7



2/10



7 min



Hint

Q : In skin, the receptors are concerned with at least _____ different senses.

A

3

B

4

C

5

D

6

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

1

2

3

4

5

6

7



3/10



7 min



Hint

Q : Neurons develop from embryonic:

A

Ectoderm

B

Endoderm

C

Mesoderm

D

All A, B, C

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

1

2

3

4

5

6

7



4/10



7 min



Hint

Q : Intermediate or relay neurons are also called as:

A

Sensory neurons

B

Motor neurons

C

Associative neurons

D

Glial cells

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

1

2

3

4

5

6

7



5/10



7 min



Hint

Q : It is the main nutritional part of neuron:

A

Dendrite

B

Soma

C

Axon

D

Myelin sheath

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

1

2

3

4

5

6

7



6/10



7 min



Hint

Q : By definition, sensory neurons connect

A

Sensory organs with CNS

B

Sensory organs with effectors

C

CNS with effectors

D

Brain with spinal cord

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

1

2

3

4

5

6

7



7/10



7 min



Hint

Q : For sound (good) reflex action, we require intact:

A

Spinal cord

B

Cerebellum

C

Hypothalamus

D

Medulla oblogata

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

1

2

3

4

5

6

7



8/10



7 min



Hint

Q : Nerve impulse involves:

A

Electrochemical changes

B

Chemical reactions

C

Movement of ions

D

All A, B, C

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT



9/10



7 min



Hint

Q : Minimum amount of stimulus required to initiate nerve impulse is called:

A

Subthreshold stimulus

B

Threshold stimulus

C

Action potential

D

Variable stimulus

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT

4

5

6

7

8

9

10



Q.10

7 marks

100%

Q It correctly represents movement of ions by Na K pump

2K⁺ inside3Na⁺ outside2K⁺ outside3Na⁺ inside3K⁺ inside2Na⁺ outside3K⁺ outside2Na⁺ inside

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT





Rec

rafted



Subject



Q The mechanisms that is found in animals on y



Diffus on



Nervous control



Respirat on



Hormonal control

Explanation

Animals have to respond quickly to the diverse environmental changes in a fraction of time therefore they need a more efficient coordination system



Correct

Not Correct



Wrong



Q In skin, the receptors are concerned with at least _____ different senses



3



4



5



6

Explanation

In the skin, there are at least 3 types of sensory endings involved in touch stimulus sensation. In skin, the receptors are concerned with at least five different senses, touch, pressure, heat, cold, and pain.



ec

neurons



neurons



neurons

Q Neurons develop from embryonic



Ectoderm



Endoderm



Mesoderm



All A, B, C

Explanation

Skin and nervous system develop from ectoderm



Q Intermediate or relay neurons are also called as



Sensory neurons



Motor neurons



Associative neurons



Glial cells

Explanation

Intermediate neurons are present in the CNS only and are involved in the processing of information.



rec

notified



notified



Q It is the main nutritional part of neuron



Dendrite



Soma



Axon



Myelin sheath

Explanation

The central part of neuron which give rise to cytoplasmic processes and contain nucleus and other organelles embedded in cytoplasmic matrix is called soma



receptor

effector



effector



Q By definition, sensory neurons connect



Sensory organs with CNS



Sensory organs with effectors



CNS with effectors



Brain with spinal cord

Explanation

Types of neurons

- Sensory neurons (Receptor Impulse CNS)
- Intermediate neurons (Sensory neuron impulse Motor neuron)
- Motor neurons (Intermediate neuron impulse Effectors)



Before

After lesion



Response



Q For sound (good) reflex action, we require intact



Spinal cord



Cerebellum



Hypothalamus



Medulla oblongata

Explanation

In vertebrates, most sensory neurons do not pass directly into the brain but synapse in the spinal cord. This allows for faster reflex actions to occur by activating spinal motor neurons without the delay of routing signals through the brain. So the spinal cord must be intact to carry out reflex actions quickly.



Correct

Incorrect



Wrong



Q Nerve impulse involves



A Electrochemical changes



B Chemical reactions



C Movement of ions



D All A, B, C

Explanation

Nerve impulse is a series of electrochemical changes which run throughout the length of neuron



rec

not recorded



not



Q Minimum amount of stimulus required to initiate nerve impulses called



Subthreshold stimulus



Threshold stimulus



Action potential



Variable stimulus

Explanation

The stimulus that generates action potential in a neuron is called as threshold stimulus



2 K⁺ out

3 Na⁺ in



2 K⁺ in

3 Na⁺ out

Q It correctly represents movement of ions by Na-K pump



2 K⁺ inside

3 Na⁺ outside



2 K⁺ outside

3 Na⁺ inside



3 K⁺ inside

2 Na⁺ outside



3 K⁺ outside

2 Na⁺ inside

Explanation

Na-K pumps actively transport ions against their concentration gradient

WWW.SAEEDMDCAT.COM

QUIZZES

Practice Test-2 (Coordination and Control)

VALIDATION AT
SAEED MDCAT TEAM

SAEEDMDCAT



Q 3

7 min

100%

Q Neuromuscular junction is an example of



A Physical synapse



B Electrical synapse



C Chemical synapse



D Biological synapse

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



Life



7 min

100%

Q It is the main neurotransmitter for synapses that lie outside the central nervous system



Acetylcholine



Adrenalin



Serotonin



Dopamine

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT





70



7 min

100

Q Gray matter does not contain cell bodies of



Sensory neurons



Associative neurons



Motor neurons



All A, B, C

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT

1

2



4

5

6

7



70

7 min

100

Q Spinal nerves carry impulse towards all of the following except



Brain



Spinal cord



Effectors



Muscles

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT





for

7 min

100%

Q Central canal containing CSF is in direct contact with



Gray matter of brain



White matter of brain



Gray matter of spinal cord



White matter of spinal cord

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT





Q. Sciatic nerve is an example of



Motor cranial nerve



Mixed cranial nerve



Motor spinal nerve



Mixed spinal nerve

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



/s



7 min

1.1k

Q It inhibits secretions of digestive tract



Sympathetic nervous system



Parasympathetic nervous system



Peripheral nervous system



Central nervous system

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



/0



7 m r



t a

Q All of the following actions are accelerated by sympathetic nervous system except



increase in heart beat



Dilation of pupils



increase in breathing rate



Increase in peristalsis

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT





/ic

7 mr

1.1

Q Abrupt transient symptoms of _____ nature can be seen in epilepsy



Motor



Sensory



Psychic



All A, B, C

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT





Q10



7 min

100

Q If onset of epilepsy is _____, it suggests organic disease



A After birth



B Before 30 years of age



C After 50-60 years



D After 30 years of age

SAEED MDCAT

SAEED MDCAT TEAM



SAEEDMDCAT



WWW.SAEEEDMDCAT.COM

Before After

Neuromuscular junction

Q Neuromuscular junction is an example of

☐ Physica synapse

☐ Electr ca synapse

☒ Chemical synapse

☐ Bi o logical synapse

Explanation

Acety choline is use to transmit impulse from neuron to muscle fiber at neuromuscular junction



Correct

Notified



Incorrect

Q It is the main neurotransmitter for synapses that lie outside the central nervous system



Acetylcholine



Adrenaline



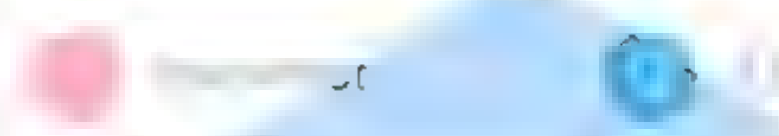
Serotonin



Dopamine

Explanation

Adrenaline, nor-adrenaline, serotonin and dopamine are mainly used within CNS synapses



Q Gray matter does not contain cell bodies of

- ☒ A Sensory neurons
- ☐ B Associative neurons
- ☐ C Motor neurons

Q All A, B, C

Explanation

Cell bodies of sensory neurons form dorsal root ganglion, which is located outside the CNS



Rec

Notified



Unanswered



Up

Q Spinal nerves carry impulse towards all of the following except



Brain



Spinal cord



Effectors



Muscles

Explanation

Spinal nerves are part of peripheral nervous system and they innervate body organs with spinal cord



Correct

Rated 3.0/5



Incorrect



Q Central canal containing CSF is in direct contact with



Gray matter of brain



White matter of brain



Gray matter of spinal cord



White matter of spinal cord

Explanation

Gray matter of brain lies outside while in spinal cord it is present inside and CSF runs inside the canal



Correct

Unattempted



Wrong



Q Sciatic nerve is an example of



Motor cranial nerve



Mixed cranial nerve



Motor spinal nerve



Mixed spinal nerve

Explanation

Sciatic nerve originates from spinal cord



Question



Highlighted

Q It inhibits secretions of digestive tract.



Sympathetic nervous system



Parasympathetic nervous system



Peripheral nervous system



Central nervous system

Explanation

ANS innervates glands, cardiac and smooth muscles. Secretions of glands of digestive tract occur predominantly in rest conditions.



Question



Answer

Q All of the following actions are accelerated by sympathetic nervous system except



Increase in heart beat



Dilation of pupils



Increase in breathing rate



Increase in peristalsis

SAEED MIDCAT TEAM

Explanation

Sympathetic nervous system initiates such responses which help in fight and flight responses



Correct

Incorrect



Wrong



Q Abrupt transient symptoms of _____ nature can be seen in epilepsy



Motor



Sensory



Psychic



All A, B, C

Explanation

Patients of epilepsy have altered perception of their surroundings and suffer from convulsions



Correct

Incorrect



Wrong



Q If onset of epilepsy is _____, it suggests organic disease



After birth



Before 30 years of age



After 50-60 years



After 30 years of age

Explanation

Onset of epilepsy occurs at early age but if onset is in late youth it suggests organic disease



WWW.SAEEEDMDCAT.COM

QUIZZES

Practice Test-3 (Coordination and Control)

Prepared by
SAEED MD CAT

SAEED MD CAT

SAEED MD CAT TEAM

SAEEDMDCAT

Q It is true about all hormones

- ☐ A Organic substances
- ☐ B Inorganic substances
- ☒ C Protein substances
- ☐ D Lipid substances

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



1/10



7 min

100%

Q It is an example of neurosecretion



TSH



ADH



Insulin



Glucagon

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



Q Secretion of ADH from posterior pituitary is caused by increase in

- ☐ A Blood pressure
- ☐ B Blood volume
- ☒ C Osmotic pressure
- ☐ D Solute concentration

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



Q



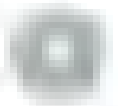
7 mar

11 a

Q Abnormal development of hands, feet and jaws in an adult due to excess secretion of growth hormone is called



Microcephaly



Polydacty



Acromegaly



Gigantism

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



Q T3 and T4 work in conjunction with

- ☐ A Calcitonin
- ☐ B Somatotropin
- ☒ C Gonadotrophin
- ☐ D Parathormone

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT

Q Under activity of parathyroid gland may lead to

- ☐ A Muscular tetany
- ☐ B Demineralization of bone
- ☐ C Rickets
- ☐ D Kidney stone

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



Q Which of the following hormone depresses blood glucose level?



SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT



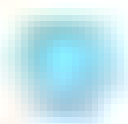
Q Which of the following hormone depresses blood glucose level?

- ☒ A Insulin
- ☐ B Glucagon
- ☐ C Cortisol
- ☐ D Calcitonin

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT





Q A hormone that stimulates production of cortisol is

- ☐ Adrenaline
- ☐ Noradrenaline
- ☒ ACTH
- ☐ Aldosterone

Q Development of certain male characters in female is due to tumor of

- ☐ A Adrena medulla
- ☐ B Thyroid
- ☒ C Adrena cortex
- ☐ D Testis

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT

Q The castrated male shows

- ☐ A Loss of male secondary sex characters
- ☐ B Sterility
- ☒ C Loss of female characters
- ☐ D Both A & B

SAEED MDCAT

SAEED MDCAT TEAM

SAEEDMDCAT

Q It is true about all hormones



Organic substances



Inorganic substances



Protein substances



Lipid substances

Explanation

Nature of hormones.

- Amino acid derivatives
- Polypeptides
- Proteins
- Steroids



Before

After



Secretion



Q It is an example of neurosecretion



TSH



ADH



Insulin



Glucagon

Explanation

Hormones produced from neurosecretory cells of hypothalamus are called as neurosecretions



Correct

Incorrect



Wrong



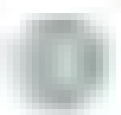
Q Secretion of ADH from posterior pituitary is caused by increase in



Blood pressure



Blood volume



Osmotic pressure



Solute concentration

Explanation

ADH released from posterior pituitary and target the collecting ducts in nephrons. There it regulates the reabsorption of water which, as a result, normalize the blood volume and blood pressure



Correct

Notified



Wrong



Mark

Q Abnormal development of hands, feet and jaws in an adult due to excess secretion of growth hormone is called



Microcephaly



Polydacty



Acromegaly



Gigantism

Explanation

Excess of growth hormones in early life leads to the abnormal growth of whole body which is called gigantism



Correct

Rate: 100%



Wrong Answer

Q T3 and T4 work in conjunction with



Calcitonin



Somatotropin



Gonadotropin



Parathormone

Explanation

T3 and T4 increase basal metabolic rate and they also play an important role in growth and development along with STH.



Correct

Incorrect



Incorrect

Q Under activity of parathyroid gland may lead to



Muscular tetany



Demineralization of bone



Rickets



Kidney stone

Explanation

Parathyroid gland produces parathormone which is released in response to low blood calcium levels and it regulate calcium from bones to the blood. Its deficiency leads to hypocalcaemia



Correct



Unattempted



Incorrect



7/10

Q : Which of the following hormone depresses blood glucose level?



Insulin



Glucagon



Cortisol



Calcitonin

Explanation

Glucagon and cortisol increase blood glucose level.



Correct



Unattempted



Incorrect



8/10

Q : A hormone that stimulates production of cortisol is:



Adrenaline



Nor-adrenaline



ACTH



Aldosterone

Explanation

Cortisol is a corticosteroid and is produced from adrenal cortex, under the influence of ACTH.



Correct



Unattempted



Incorrect



9/10

Q : Development of certain male characters in female is due to tumor of:



Adrenal medulla



Thyroid



Adrenal cortex



Testis

Explanation

A tumor on adrenal cortex leads to its hyperactivity in older females. This is the main cause of appearance of male characters in females.



Correct



Unattempted



Incorrect



10/10

Q : The castrated male shows:



Loss of male secondary sex characters



Sterility



Loss of female characters



Both A & B

Explanation

Removal of male gonads results in lack of testosterone which ultimately results in under developed male secondary sex characters.